



m 370026

m 370012

Please file

Denison Mines (USA) Corp.
1050 17th Street, Suite 950
Denver, CO 80265
USA

Tel : 303 628-7798
Fax : 303 389-4125

www.denisonmines.com

August 21, 2007

Paul Baker
Utah Division of Oil, Gas and Mining
1594 West North Temple, Suite 1210
Salt Lake City, Utah 84114-5801

Paul Baker:

Re: Notice of Maintenance Activities for Three Ventholes Associated with the Pandora and LaSal/Snowball Mines (M/037/012 and M/037/026).

This letter is to serve as notification that Denison Mines (USA) Corp. will be performing maintenance operations on two ventholes within the existing disturbed area for the Pandora and LaSal/Snowball mines and bonded with the Utah Division of Oil Gas and Mining, permit numbers M/037/012 and M/037/026. In addition, a third vent hole that has been backfilled and will be reopened to provide ventilation to the Pandora Mine.

In the case of vent holes, historically separate ownership and permitting, and the current interconnection of mine workings obscures the identification of individual vents with specific mine permits; therefore, the vent holes have been assigned (for purposes of estimating reclamation surety) to the permit that was most convenient as shown below. Denison Mines is not currently operating at the LaSal/Snowball; however, ventilation is required for existing, permitted and approved operations at the Pandora Mine. When operations commence at the LaSal/Snowball Mine, the BLM and UDOGM will be notified prior to the commencement of operations. The ventholes to undergo maintenance activities and to be reopened are permitted and located as follows:

Unnamed Vent #7 (Pandora Mine) – located in the northeast quarter of northwest quarter of Section 1, Township 35 South, Range 11 East, San Juan County, Utah.

Snowball #5 Vent (LaSal/Snowball) – Located in the northeast quarter of the northeast quarter of Section 1, Township 35 South, Range 11 East, San Juan County, Utah.

Snowball #6 Vent (LaSal/Snowball) (Reclaimed vent hole) – Located in the southwest quarter of the northwest quarter of Section 6, Township 35 South, Range 11 East, San Juan County, Utah.

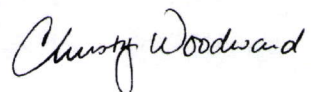
The disturbed areas for the vent holes unnamed #7 and Snowball #5 are approved and bonded under the Pandora and LaSal/Snowball Mine permits and bonds as specified above. The Snowball #6 venthole will need to be added to the LaSal Bond. A map showing the locations of these vent holes is provided in Attachment A. A description of the proposed maintenance activities and the proposed reclamation at the venthole sites is included in Attachment B. A proposed surety estimate for Snowball #6 is included as Attachment C.

Bonded
under
Pandora

RECEIVED
AUG 22 2007
DIV. OF OIL, GAS & MINING

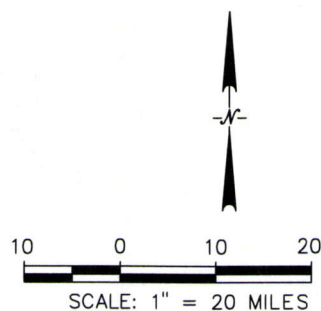
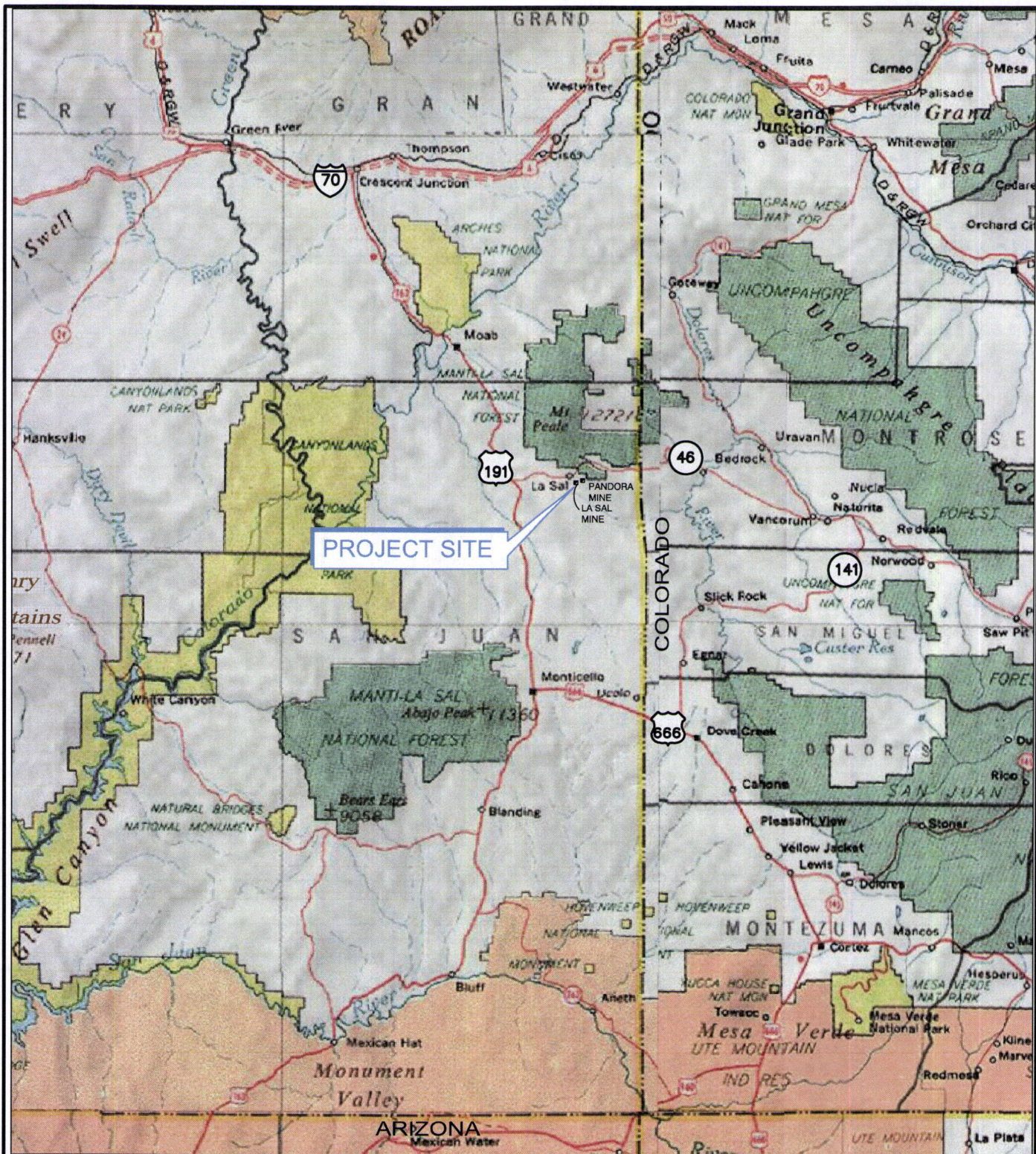
Please contact me directly if you have any questions or would like additional information 303.389.4136.

Respectfully,

A handwritten signature in cursive script that reads "Christy Woodward".

Christy Woodward
Environmental Coordinator
Denison Mines Corp.

CC: Denison File
Terry V. Wetz



Project			
PANDORA MINE			
County: San Juan	State: Utah	Location: Parts of R 24 E & R 25 E, T 28 S & T 29 S	
DSGN: DMF	DRN: DMF	DATE: 07/30/2007	REVISION:

FIGURE 1
SITE LOCATION MAP

Prepared By:



ATTACHMENT B
PROPOSED ACTIVITY AND RECLAMATION DESCRIPTION

ATTACHMENT B PROPOSED ACTIVITY AND RECLAMATION DESCRIPTION

Vent Holes

In the case of vent holes, historically separate ownership and permitting of the mines and the current interconnection of mine workings obscures the identification of individual ventholes with specific mine permits; therefore, the vent holes have been assigned (for purposes of estimating reclamation surety) to the permit that was most appropriate. Based on this information, two of the proposed ventholes are currently associated with the LaSal/Snowball permit and bond and one is associated with the Pandora permit and bond. Denison Mines is not currently operating at the LaSal/Snowball; however, the underground workings for the two mines are connected and ventilation is required for existing, permitted and approved operations at the Pandora Mine. When operations commence at the LaSal/Snowball Mine, the Bureau of Land Management (BLM) and Utah Division of Oil Gas and Mining (UDOGM) will be notified prior to the commencement of operations.

Currently, all three ventholes have experienced sloughing of rock from the sides of the venthole into the venthole opening, temporarily closing the vent. As part of the current operations at the Pandora, Denison Mines proposes to reopen two vent holes located on BLM Land (Unnamed Vent #7 and Snowball #5). In addition, a third venthole (Snowball #6) which was previously backfilled (and removed from the bond), also located on BLM Land, will be reopened. The ventholes are permitted and located as follows:

Unnamed Vent #7 (Pandora Mine) – Located in the northeast quarter of the north half of the northeast quarter of Section 1, Township 35 South, Range 11 East, San Juan County, Utah.

Snowball #5 Vent (LaSal/Snowball) – Located in the northeast quarter of the northwest quarter of Section 1, Township 35 South, Range 11 East, San Juan County, Utah.

Snowball #6 Vent (LaSal/Snowball) – Located in the southwest quarter of the northwest quarter of Section 6, Township 35 South, Range 11 East, San Juan County, Utah.

A general location map is provided as Figure 1 and the mine and venthole locations are shown on Figure 2 in Attachment A. The exact locations of the ventholes was dependent on the configuration of the mine workings and the past air quality in the mine. Access to these vent holes is via existing roads; therefore, no new road construction is proposed.

The vent holes are approximately 6 feet in diameter, similar to existing vent holes in the area. Currently, the surface disturbance associated with the vent holes is minimal (approximately ¼ acre per vent hole). Metal diffusers are installed above the opening at the surface of Unnamed Vent #7 and Snowball #5. The diffusers are approximately 4 to 5 feet tall and screened on top to prevent entry. A drill rig will be brought to the surface location of each venthole and an 11 inch test hole will be drilled into the center of each vent hole. Following the test hole drilling, upream drilling will be conducted to remove loose rock that has fallen into and filled the ventholes. All rock within the vent holes will fall into the underground mine workings during the upream drilling and will be moved underground into mined out areas of the mine, or moved to the waste rock pile at the Pandora portal (Figure 2). No increase in existing surface disturbance is anticipated to occur at the three venthole sites.

In the event that the loose rock debris inside the vent holes makes drilling cost prohibitive or proves to be infeasible, replacement vent holes will be drilled approximately 30 to 40 feet away from the existing ventholes, while staying within the existing disturbed foot print. The existing venthole area will then be concurrently reclaimed, as described in the following sections. New vent holes are installed by drilling a small test hole, then

upreaming from the underground mine workings and removing the rock that falls into the mine in the same manner as previously described for the rubble in the existing vent holes.

The reclaimed vent hole (Snowball #6) will be reopened with the same process as reopening the existing vent holes.

Power is supplied to the venthole sites either from underground or via existing overhead electric power. The power lines to the ventholes are owned by the electric utility until the last 30-40 feet (approximately), and therefore, no bonding to remove these lines is included in the surety estimates.

Reclamation

This reclamation amendment is for the venthole that was previously reclaimed (Snowball #6). The other two vent holes are currently included in the surety bond for the Pandora (Unnamed Vent #7) and the Snowball (Snowball #5). This surety estimate was updated in 2005 and is considered current. These vent holes are anticipated to be reopened between 2007 and 2008. The disturbed area anticipated for Snowball #6 will be approximately ¼ acre. Access to the Snowball #6 vent hole is located south of the main portal area for the Snowball Mine. The surface site of the Snowball #6 is within the existing disturbed area footprint of the Snowball Mine, so no new disturbance will be created to access the site.

Vent holes are reclaimed by welding a steel plate over the vent hole casing and then constructing a reinforced concrete cap over the steel plate. The concrete cap will include small I-beams, angle iron, and rebar for structural support and a minimum thickness of 6 inches of concrete. The concrete cap will be covered by 3 to 4 feet of soil collected from within the area of disturbance associated with the vent hole. Topsoil removed from the closed venthole will be graded to one side for later use when closing the approximate 6 foot venthole opening. All disturbed areas will be ripped and seeded in the late fall or early spring for concurrent reclamation.

The existing BLM approved seed mixture for the Pandora and LaSal/Snowball Mines is below:

Species Name	Common Name	Seeding Rate (lbs Pure Live Seed/Acre)
BLM Approved Seed Mix		
<i>Thinopyrum intermedium</i>	Intermediate Wheat Grass	4
<i>Agropyron cristatum</i> (L.) Gaertn.	Crested Wheat Grass	1
<i>Atriplex canescens</i>	Four-wing Saltbrush	1
<i>Melilotus officinalis</i>	Yellow Sweet Clover	1
<i>Bromus inermis</i> Leyss	Smooth Brome	4
Total lbs/acre		11

**TABLE 1
MINE OPENINGS**

Vent Holes	Number of Ventholes	Quantity	Unit	Unit Cost	Estimated Cost
Excavate around vent hole (8 bcy/vent) (a)	1	0.13	day	\$1,326.80	\$172
Cut, weld, and pour concrete					
- Welder	1	0.75	day	\$789.45	\$592
- Laborer	1	1.25	day	\$341.20	\$427
- Steel Plate (6' x 6') (b)	1	1	Ea.	\$100.00	\$100
- Steel I-Beam (22')	1	22.0	lf	\$9.40	\$207
- Rebar (c)	1	132.0	lf	\$0.03	\$4
- Concrete (6' x 6' x 6") (d)	1	30.0	bag	\$9.10	\$273
Backfill over cover (36 sf x 6' D + 28 sf x 4' D)	1	12.2	cy	\$0.99	\$12
Venthole Diffuser Demolition	1	120.0	CF	\$0.28	\$34
Vent Hole and Adit Pads (grading & ripping)	1	0.25	AC	\$978.00	\$245
Revegetating Disturbed Vent Hole Areas (f)					\$0
Subtotal					\$2,065
Contingency (10%)					\$207
Subtotal					\$2,272
Management (10%)					\$227
Subtotal					\$2,499
Escalation (3.2% per year for 3 years)					\$2,747

Total Cost Estimate for Pandora Vent Holes: **\$2,747**

Notes:

- (a) Assume that a hydraulic excavator can excavate around a vent hole in 1 hour and tram to next vent hole (ave. 3/4-mile) in 15 minutes. Allow 1 hour for initial tramping from main site to first vent hole.
- (b) Cost was estimated based on industry knowledge.
- (c) Rebar calculated based on 6-inch spacing.
- (d) Concrete calculated based on 0.6 cf/bag.
- (e) At the vent hole, a 4-foot high diffuser and approximately 4 feet of casing will be removed and disposed. The 8-foot height was multiplied by the number of vent holes (1) to calculate a total height of 8 feet. The diffuser and casing is typically 5 to 6 feet in diameter.
- (f) The Snowball #6 venthole is within the disturbed area footprint of the Snowball Mine and no new disturbed area will be created. The revegetation of the vent hole site is therefore, covered under the bonding for the surface facilities area for the Snowball Mine.

**Surety Estimate
for the
Snowball Mine Venthole Amendment
San Juan County, Utah**

August 2007

RECLAMATION COST ESTIMATE PANDORA MINE VENT HOLES

1.0 INTRODUCTION

This reclamation cost estimate is based on a conservative scenario in which two existing vent holes are re-opened and one reclaimed vent hole is reopened with no concurrent reclamation included. The estimate is based on unit costs presented in the 2005 RSMeans Environmental Remediation Cost Data – Unit Price handbook published by Reed Construction Data, Inc. (RCD) (RCD 2005a), the 2006 RSMeans Heavy Construction Cost Data handbook (RCD 2005b), the 2006 Means Site Work and Landscape Cost Data handbook (RCD 2006c), and the reclamation plan requirements detailed in Attachment B. This approach is consistent with guidance provided by the Utah Division of Oil, Gas and Mining (DOGM).

Unit prices from the RSMeans handbooks are summarized in Appendix A. These prices include the contractor's overhead and profit; therefore, these items are not included as separate line items in the estimate. Each unit price is referenced to both the section and page number where it can be found in the specified handbook. The unit prices from the 2005 environmental handbook (RSMeans 2005a) were increased by four percent to account for two years of inflation. The unit prices have not been adjusted for location because all of the Utah cities referenced in the handbooks are either slightly above or below average for the country.

Production factors from the Caterpillar Performance Handbook, Ed. 29 (Caterpillar 1998) were used to adjust earthwork production rates for bulk grading. All assumptions and estimates are clearly identified in this estimate. Project specific price quotes for those items that could not be found in the RSMeans Handbook (e.g., prices for native seed mix) are also included and their source referenced.

The cost estimate and Appendix A are divided into the following four closures and reclamation categories.

- I. Structures and Foundations: Consists of the demolition of buildings and other structures (e.g., venthole diffusers). Inert solid waste such as concrete pads and foundations, concrete blocks, bricks, and glass will be broken up and either buried in the immediate area or disposed of in the underground workings.
- II. Mine Openings: All ventholes will be permanently sealed and covered.
- III. General Earthwork: Consists of grading to achieve stable and free draining slopes, ripping of compacted areas, and placement of salvaged topsoil.
- IV. Seeding: Includes disking and seeding of the more level areas (i.e., slopes flatter than 3H:1V) using a tractor, dozer, or equivalent machinery equipped with a disk and broadcast spreader. Steeper areas (i.e., slopes of 2H:1V to 3H:1V) will be pocked using a track-mounted backhoe or hydraulic excavator and broadcast seeded by hand. Pocking consists of creating vegetative micro-basins by digging a bucket load of soil at an 18-inch depth and depositing the soil 2 to 3 feet above the newly created basin. The process is repeated in a random and overlapping pattern to eliminate downhill conduits for surface water runoff.

The assumptions and methods used to develop the cost estimate are described below for each of the four reclamation categories listed above. The cost estimate for reclamation is included in Table 1.

2.0 STRUCTURES AND FOUNDATIONS

Estimated costs for demolishing the project's structures, disposing of the building materials at the local landfill, and breaking up and burying the concrete pads are presented in Table 1.

2.1 Buildings and Structures

The venthole diffuser and casing removed during reclamation will also be buried at the mine surface facilities. Disposal costs for burial at the mine surface facilities are based on the disposal quantity being approximately one-third of the intact, in-place volume with an average density of 300 pounds per cubic yard.

4.0 MINE OPENINGS

Table 1 provides estimated costs for sealing and covering the vent holes and portals. The cost estimate includes the sealing and closure of one vent hole.

4.1 Vent Holes

The first step in reclaiming the vent hole will consist of digging down four to six feet deep around the hole and cutting the casing off from three to four feet below the ground surface. The RSMeans unit prices for trenching assume that the excavator is set-up and working in one location. 1 hour was allotted toward excavating around the vent hole including traveling from the portal area to the initial excavation, overall 1 hour was assumed.

After the casing is cut off, a steel plate will be welded over the opening and structural steel (i.e., small I-beams and rebar) will be welded over the top of the steel plate to form a six-inch-thick, reinforced cover. Concrete will be poured between the I-beams and around the rebar to complete the installation. A minimum of three feet of soil will be placed over the cover. The estimate assumes that a welder and laborer can cut the casing and weld together a cover in six hours and that two laborers can hand mix and pour the concrete for each cover in 2 hours. Materials are based on average cover dimensions of six feet by six feet. Unit costs for sealing the venthole are presented in Part II.A through G of Appendix A.

5.0 GENERAL EARTHWORK

For the purposes of this estimate, earthwork is divided into bulk grading/excavation, rough grading and ripping (gentle slopes), rough grading and pocking (steeper slopes), topsoil hauling and placement, and installation of riprap and sediment control measures.

5.1 Grading and Ripping

Grading will occur at the venthole location as necessary following closure. The venthole area will be graded and ripped. Grading will produce a free draining surface that blends with the surrounding topography. Ripping will loosen the upper 6 to 9 inches of soil so that it can more readily support vegetative growth. Ripping will typically be done after topsoil placement and will follow the contour on sloped areas.

Unit costs for grading and ripping are presented in Table 1 and are based on using a 200 hp dozer (equivalent to a Caterpillar D-4) with rippers. This choice of equipment is more applicable to projects such as golf courses or parks, rather than mined-land reclamation. For this project, it is assumed that a 300 hp dozer is used with the same unit prices as a 200 hp dozer (i.e., the higher unit price of the bigger dozer is balanced by its higher productivity).

5.2 Topsoil Placement

Topsoil will be placed over the top of the disturbed area the small access road and pad leading to the vent hole. The existing soil in this non-topsoiled area will be used as the growth media for revegetation. Unit costs for topsoil placement are presented in Table 1.

6.0 REVEGETATION

Revegetation will consist of seeding of all disturbed areas using an approved native seed mix. No additional revegetation practices such as fertilization or mulching will be employed. Table 1 presents the estimated cost for seeding.

6.1 Seeding

The flatter areas with slopes less than 15 degrees (3.73H:1V) will be seeded and disked using a small off road ATV or equivalent equipped with a broadcast spreader and disk (i.e., multiple-shank rippers). Areas with slopes greater than 15 degrees will be broadcast seeded and raked by hand. Table 1 identifies unit costs per acre and unit prices per acre for the seed mix.

REFERENCES

Caterpillar Inc. 1998. Caterpillar Performance Handbook, Ed. 29, Peoria, Illinois.

Reed Construction Data (RCD), Inc.. 2005a. "2005 RSMeans Environmental Remediation Cost Data – Unit Price, 11th Annual Edition".

Reed Construction Data (RCD), Inc. 2005b. "2006 RSMeans Heavy Construction Cost Data, 20th Annual Edition".

Reed Construction Data (RCD), Inc. 2005c. "2006 RSMeans Site Work and Landscape Cost Data, 25th Annual Edition."

APPENDIX A MEANS COST DATA

Listed unit costs are from the primary reference except where noted otherwise.

Primary Reference:

- 2006 RSMeans Heavy Construction Cost Data, 20th Annual Edition, Kingston, MA.

Secondary References:

- 2005 RSMeans Environmental Remediation Cost Data – Unit Price and Assemblies, 11th Annual Edition, Azimuth Group, Ltd. and ECHOS, LLC.
- 2006 RSMeans Site Work and Landscape Cost Data, 25th Annual Edition, Kingston, MA.
- Caterpillar Performance Handbook, Ed. 29 by Caterpillar Inc., Peoria, IL, 1998.
- Seed and Inoculation Quotes from Carhart Feed and Seed Inc. in Dove Creek, Colorado.

Part I: Structures and Foundations

- A. Section 02220 110 Building Demolition (pg. 25)
0500: Small bldgs., or single bldgs. no salvage included, steel
= Crew B3, 14,800 cf/day, \$0.28/cf
(includes 20 miles haul, dump fees not included)

Part II: Mine Openings

- A. Section 02315 610 Excavating, trench (pg. 58)
0110 ¾ cy hydraulic backhoe
300 bcy/day, \$4.42/bcy
Crew B-12F, 1 equip operator, 1 laborer, 1 excavator = 1,326.80/day
- B. Section 05090 900 Welding Structural (pg 190)
0020: Field welding, 1/8" E6011, cost per welder, no oper. engr.
= Crew E-14, 8 hours/day, \$92/hr or \$736/day
Add 1 Cutting Torch, \$17.80/day (see Crew E-25, pg. 430)
Add 0.5 Gases, \$35.65/day (see Crew E-25, pg. 430)
Total = \$789.45/day
- C. Miscellaneous Costs (pg. 408)
1 Laborer, \$341.20/day (see Crew A-2)
- D. Section 05120 640 Structural Steel Members (pg. 193)
0100: W 6 x 9 (matl. only)
= \$9.40/lf
- E. Section 03210 500 Reinforcing Steel, A615 (pg. 152)
2550: #4 rebar, \$77/ton or \$0.03/lf

- F. Section 03060 200 Cement Material Only (pg. 137)
0240: Portland, Type I/II, TL Lots, 94 lb bags = \$9.10/bag
- G. Section 02315 120 Backfill Structural, Dozer or Front End Loader (pg. 48)
2020: 80 HP, 50' haul, Common Earth, 1100 lcy/day
= Crew B-10L, 1,100 lcy/day, \$0.99/lcy

Part III: General Earthwork

- A. Section 02910 710 Lawn Bed Preparation (pg. 121)
2610: Rough grade & scarify subsoil to receive topsoil, Common earth, 200 HP dozer with scarifier
= Crew B-11A, 80 msf/day or 1.8 ac/day, \$22.50/msf or \$978/ac
- B. Crew B-12F (pg. 413), ¾ cy hydraulic excavator for soil pocking
1 equip operator, 1 laborer, 1 hydraulic excavator = \$1,326.80/day (includes O&M)

Part V: Seeding

- A. 2006 RSMeans Site Work and Landscape Cost Data
Section 02910 710 Lawn Bed Preparation (pg. 130)
3200: Scarify soil, Large commercial, 135 HP Grader w/ scarifier
= Crew B-11L, 280 msf/day or 6.4 ac/day, \$4.60/msf or \$200/ac